tion of an audible signal in a memory of a first user communication device, and forwarding a call signal that includes the digital representation towards a second user communication device. Thereafter, when the call signal is eventually received at the second user communication device, further step is performed of generating the audible signal represented by the digital representation included in the received call signal.

In accordance with another embodiment of this invention, information (e.g., a telephone number) identifying the calling source is extracted from the received call signal in the second user communication device, and is then compared with prestored information to determine it the receiving device is authorized to generate the audible signal represented by the received digital representation. This procedure prevents the device from generating, for example, sounds which the user may not wish to hear, such as, for example, commercial advertisements.

Any suitable types of user communication device may be used in this invention, such as, for example, a telephone, a radiotelephone, an information appliance, or a pager.

BRIEF DESCRIPTION OF THE DRAWINGS

The present invention will be more readily understood from a detailed description of the preferred embodiments taken in conjunction with the following figures:

FIG. **1** is a block diagram of a communication system that is suitable for practicing this invention.

FIG. **2***a* is a block diagram of a user communication terminal of the system of FIG. **1**, wherein the terminal is constructed and operated in accordance with this invention.

FIGS. **2***b* and **2***c* show data tables T**1** and T**2**, respectively, that form a portion of a memory of one or more user communication devices of the system of FIG. **1**.

FIG. **2***d* is a block diagram of a user information appliance of the system of FIG. **1**, wherein the appliance is constructed and operated in accordance with this invention.

FIGS. **3***a* and **3***b* are a logical flow diagram of a method for enabling a user to select a type of alerting signal which he desires to be employed at a receiving communication device when an incoming call signal is received at the device, in accordance with this invention.

FIG. **3***c* is a logical flow diagram of a procedure executed during the performance of the method of FIGS. **3***a* and **3***b*, according to another embodiment of this invention.

FIGS. **4***a* and **4***b* are a logical flow diagram of another method in accordance with this invention, wherein the portion of the method shown in FIG. **4***b* enables an alerting signal selected by a user during the performance of the method of FIG. **3***a*, **3***b*, or **4***a*, to be generated at a receiving communication device when an incoming call signal is received at that device.

FIG. **5** shows a logical flow diagram of a method for normalizing acoustic information entered into a user communication device of the system of FIG. **1**, during the performance of the methods of FIGS. **3***a*, **3***b*, **4***a*, and **4***b*.

Identically labeled elements appearing in different ones of the figures refer to the same elements but may not be referenced in the description for all figures.

DETAILED DESCRIPTION OF THE PREFERRED EMBODIMENTS

FIG. **1** is a block diagram of a communication system **1** that is suitable for practicing this invention. In the illustrated embodiment, the communication system **1** comprises a plurality of user communication terminals **18***a*, **18***b* and user information appliances **19***a*, **19***b*, hereinafter referred to collectively as "user communication devices", and a plurality of communication networks **32**, **34** which are bidirectionally coupled to another communication network entity, such as the Internet **17**. Traditionally, various types of interconnecting equipment may be employed for connecting the networks **32**, **34** and user information appliances **19***a*, **19***b* (via respective interfaces **3***a* and **3***b*) to the Internet **17**, such as, for example, gateways, optical fibers, wires, cables, switches, routers, modems (in the case of user information appliances **19***a*, **19***b*), and other types of communication equipment, as can be readily appreciated by one skilled in the art, although, for convenience, no such equipment is shown in FIG. **1**. The networks **32**, **34** are typically provided and maintained by an enterprise, such as a service provider SP**1**, SP**2**.

In the illustrated embodiment, the user communication terminal **18***a* is a radiotelephone that includes an antenna **18***a*' for transmitting signals to and receiving signals from a base site or base station **30** of the network **32**, via an interface **19**. Preferably, the interface **19** is a wireless interface, and the user communication terminal **18***a* is capable of operating in accordance with any suitable wireless communication protocol, such as IS-136, GSM, IS-95 (CDMA), wideband CDMA, narrow-band AMPS (NAMPS), and TACS. Dual or higher mode phones (e.g., digital/analog or TDMA/CDMA/analog phones) may also benefit from the teaching of this invention, and so called "Voice-Over-IP" technology, such as H.323 and SIP protocols, may also benefit as well. It should thus be clear that the user communication terminal **18***a* can be capable of operating with one or more air interface standards, communication protocols, modulation types, and access types, and that the teaching of this invention is not limited for use with any particular one of those standards/protocols, etc.

The network **32** preferably is a cellular network that includes the base station **30**, a main switching office (MSO) **31** bidirectionally coupled between the base station **30** and the Internet **17**, a database **33**, and a server **33**'. The MSO **31** controls the exchange of information between the user communication terminal **18***a*, the Internet **17**, and other communication devices which may be connected to the MSO **31**, such as Public Switched Telephone Network (PSTN) telephones (not shown). This information may include, for example, voice and data messages. The database **33** is bidirectionally coupled to the Internet **17** through the server **33**', and is employed for storing various types of information, including information representing user-selected call alerting signals, as will be further described below.

The server **33**' is a computer or farm of computers that facilitate the transmission, storage, and reception of information between different points, such as between the database **33** and the Internet **17**. From a hardware standpoint, a server **33**' typically includes one or more components, such as one or more microprocessors (not shown), for performing the arithmetic and/or logical operations required for program execution, and disk storage media, such as one or more disk drives (not shown) for program and data storage, and a random access memory, for temporary data and program instruction storage. From a software standpoint, a server **33**' typically includes server software resident on the disk storage media, which, when executed, directs the server **33**' in performing data transmission and reception functions. The server software runs on an operating system stored on the disk storage media, such as UNIX or Windows NT, and the operating system preferably adheres to TCP/IP protocols. Also, in a preferred embodiment, the server **33**' is a Web or HTTP server, and the server software enables the server **33**' to exchange information with client software (typically a